



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
-----------------	-------------	----------------------	---------------------	------------------

10/516,612

07/26/2005

Christoffer Apneseth

034193-009

7118

21839

7590

10/31/2007

BUCHANAN, INGERSOLL & ROONEY PC

POST OFFICE BOX 1404

ALEXANDRIA, VA 22313-1404

EXAMINER

MANDADI, YESHOROCHAN K

ART UNIT

PAPER NUMBER

4177

NOTIFICATION DATE

DELIVERY MODE

10/31/2007

ELECTRONIC

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

ADIPFDD@bipc.com

debra.hawkins@bipc.com

Office Action Summary

Application No.

10/516,612

Applicant(s)

APNESETH ET AL.

Examiner

Yeshorohan K. Mandadi

Art Unit

4177

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 26 July 2005.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-4 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-4 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 26 July 2005 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☒ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- ☐ Notice of References Cited (PTO-892)
- ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- ☒ Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date 12/03/2004.
- ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____.
- ☐ Notice of Informal Patent Application
- ☐ Other: _____.

DETAILED ACTION

Claim Rejections - 35 USC § 102

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

2. **Claims 1 – 4**, are rejected under 35 U.S.C. 102(b) as being anticipated by **Flach et al. (US 5,748,103)**.

Regarding **claims 1 and 4**, Flach teaches the method and the system for operating a system according to TDMA (Time Division Multiple Access) with a multiplicity of wireless sensors and/or actuators as nodes (S.1 . . . S.n) and a base station (BS), said system being installed in a machine or installation, such as industrial robots or an automated manufacturing or production unit, [**Flach: Abstract, 4 - 10**]

whereby cyclical TDMA data transmission blocks are transmitted and each TDMA data transmission block is composed of consecutive time slots, [**Flach: C8, 1 - 7; Figure 3**]

whereby each time slot is allocated to a specific node, [**Flach: C5, 35 - 39**]

wherein the uplink signals (UL.1 . . . UL.n) can be transmitted from the different nodes (S.1 . . . S.n) to the base station (BS) simultaneously on two, three or more different frequencies (f1, f2, f3), [**Flach: C5, 44 - 48**]

Art Unit: 4177

whereas the downlink signals (DL) are transmitted from the base station (BSA) to the different nodes (S.1 . . . S.n) on only one frequency, which differs from the uplink frequencies, **[Flach: C8, 53 - 56]**

whereby the time slots and the different uplink frequencies of the different nodes are defined once and are thereafter retained. **[Flach: C10, 2 - 10; C11, 27 - 30]**

Regarding **claim 2**, Flach teaches the method according to claim 1, wherein the different uplink frequencies of the different sensors and/or actuators (S.1 . . . S.n) and the downlink frequency are defined in such a way that interferences are avoided as far as possible. **[Flach: C12, 17 - 24]**

Regarding **claim 3**, Flach teaches the Method according to claim 1, wherein the frequency hopping method is used. **[Flach: Abstract, 18 - 21]**

Conclusion

3. Any response to this Office Action should be **faxed** to (571) 273-8300 or **mailed**
to:

Commissioner for Patents ,
P.O. Box 1450
Alexandria, VA 22313-1450

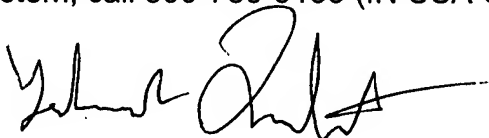
Hand-delivered responses should be brought to
Customer Service Window
Randolph Building
401 Dulany Street
Alexandria, VA 22314

Art Unit: 4177


4. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Yeshorohan K. Mandadi whose telephone number is (571) 270-1658. The examiner can normally be reached on M-T(8am-5pm) EST.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Benny Tieu can be reached on (571) 272 - 7490. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.



Yeshorohan K. Mandadi
AU 2609



BENNY Q. TIEU
SPE / TRAINER